

REMARKS/ARGUMENTS

Upon entry of the instant reply, claims 27, 28, 30-33 and 35-42 are pending.

Claims 27, 33, 39 and 42 are independent claims.

Reconsideration and allowance of the application are respectfully requested.

Restarting Of Shortened Statutory Period

Further to Applicants' Paper Regarding Mailing of New Office Action Resetting Three Month Shortened Statutory Period for Response, filed March 8, 2005, this is to once again confirm that this Office Action starts a new three month shortened statutory period for response and replaces the Office Action mailed December 13, 2004.

Allowable Subject Matter And Withdrawal Of Previous Rejections

Applicants express appreciation for the indicated allowance of claim 42, and the withdrawal of the previous rejections based upon 35 U.S.C. 112, first and second paragraphs, and the prior art of record.

Applicants note that a new rejection based upon newly-discovered Skulnick et al. (Skulnick), J. Med. Chem., 1985, Vol. 28, pp. 1864-1869, has been included in the Office Action. However, as will be set forth herein, the rejection of claims 27, 28, 30-33 and 35-41 is without appropriate basis and should be withdrawn.

Response To Rejection Based Upon Skulnick

Claims 27, 28, 30-33 and 35-41 are rejected under 35 U.S.C. 103(a) as being unpatentable over Skulnick

In this ground of rejection, two pyrimidinone compounds are referenced on page 1867, i.e., compounds #112 and 113, and an intermediate on page 1864 that are asserted to be homologous to the compounds included in Applicants' claims with the following substituents:

- i. R^2 is hydrogen or halogen atom
- ii. R^3 is 4-pyridyl
- iii. R^1 is $-N(R^4)-W-R^5$
- iv. W is a single bond
- v. R^4 is a hydrogen, so that R^1 is $-NHR^5$

The Examiner notes a difference in the compounds by having NH_2 (a primary amine) at the second position, and not $-NHR^5$ (a secondary amine). However, the rejection asserts that the compounds are the next obvious homologues to the compounds of Skulnick, and can be used as an antiviral agent or an intermediate.

In response, Applicants respectfully submit that Skulnick is determining the effects of molecular modifications at the 6-position of the 2-amino-5-halo-4-pyrimidinone structure upon antiviral activity and IFN induction in mice. There is no motivation in Skulnick to modify the primary amine to a secondary amine. Moreover, there is no motivation to modify a secondary amine with various substitutions as recited in Applicants' claims.

Expanding upon the above, the Examiner's attention is directed to Skulnick, page 1864, left-hand column, third paragraph, wherein it is disclosed that:

Further biological evaluation of an initial lead candidate in this second-generation pyrimidinone series, 2-amino-5-bromo-6-phenyl-4(3H)-pyrimidinone (ABPP), served to unravel an intriguing spectrum of immunomodulatory activity that may be related to its antiviral and antitumor activity. In efforts to elucidate the structure-activity relationship (SAR) profile of these bioactivities in this pyrimidinone series, we have systematically varied synthetically accessible points in the generic molecule. **We report herein the effects of molecular modifications at the 6-position of the 2-amino-5-halo-4-pyrimidinone structure upon antiviral activity (SFV and HSV-1) and IFN induction in mice.**

(Footnote omitted and emphasis added.)

Thus, Skulnick discloses manipulation of the 6-position and does not teach or suggest the manipulation of the NH₂ group of the structure of the 2-amino-5-halo-4-pyrimidinone structure disclosed therein. Moreover, Skulnick does not provide any teaching or suggestion as to why one having ordinary skill in the art would modify the NH₂ group from a primary amine to not -NHR⁵. The rejection is therefore improper in making an asserted modification of the reference without our teaching or suggestion in the prior art to manipulate a chemical moiety that the reference does not suggest as being desired to be manipulated.

For example, the Examiner's attention is directed to *In re Grabiak*, 226 USPQ 870 (CAFC 1985) wherein the court stated that, "None of these cases requires the result that a thioester derivative may be deemed *prima facie* obvious from the corresponding ester in the absence of prior art on this point." In the instant situation, there is nothing in the prior

art that teaches or suggests any type of substitution in Skulnick that would arrive at Applicants' claims.

With regard to the above, the only teaching or suggestion to arrive at the compounds in Applicants' claims is in Applicants' specification, and a rejection cannot properly utilize Applicants' disclosure as the basis of a rejection. There must be adequate support for the rejection in the prior art.

Accordingly, the rejection of record should be withdrawn.

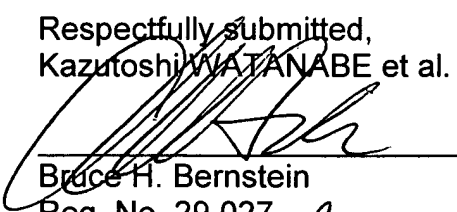
CONCLUSION

In view of the foregoing, the Examiner is respectfully requested to reconsider and withdraw the rejections of record, and allow all the pending claims.

Allowance of the application is requested, with an early mailing of the Notices of Allowance and Allowability.

If the Examiner has any questions or wishes to further discuss this application, the Examiner is invited to telephone the undersigned at the below-listed telephone number.

Respectfully submitted,
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*Approved True
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